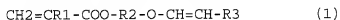


CLAIMS

1. A vinyl ether group-containing (meth)acrylic ester composition

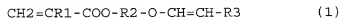
which comprises a radical polymerization inhibitor and a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

2. A vinyl ether group-containing (meth)acrylic ester composition as in claim 1,

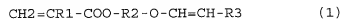
which comprises a radical polymerization inhibitor, a basic compound and a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

3. A method of producing the vinyl ether group-containing (meth)acrylic ester composition according to Claim 1,

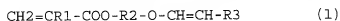
which comprises causing a radical polymerization inhibitor, or both of a radical polymerization inhibitor and a basic compound to coexist with a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

4. A method of handling a vinyl ether group-containing (meth)acrylic ester

which comprises handling in the condition such that a water concentration in a liquid phase containing a vinyl ether group-containing (meth)acrylic ester is not more than 15% by weight and said vinyl ether group-containing (meth)acrylic ester being represented by the following general formula (1):

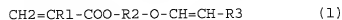


in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

5. A method of handling a vinyl ether group-containing (meth)acrylic ester

which comprises handling in the condition such that a molecular oxygen concentration in the gaseous phase in contact with a vinyl ether group-containing (meth)acrylic ester is 0.01 to 15% by volume and

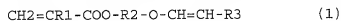
said vinyl ether group-containing (meth)acrylic ester being represented by the following general formula (1):



in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

6. A method of handling a vinyl ether group-containing (meth)acrylic ester

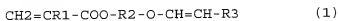
which comprises handling a vinyl ether group-containing (meth)acrylic ester in a lightproof structure and said vinyl ether group-containing (meth)acrylic ester being represented by the following general formula (1):



in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

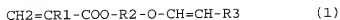
7. A method of handling a vinyl ether group-containing (meth)acrylic ester

which comprises handling a vinyl ether group-containing (meth)acrylic ester in a lightproof structure while keeping a molecular oxygen concentration in the gaseous phase within said lightproof structure at 0.01 to 22% by volume and said vinyl ether group-containing (meth)acrylic ester being represented by the following general formula (1):



in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

8. A method of producing a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



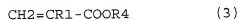
in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue,

which comprises reacting a hydroxyl group-containing vinyl ether represented by the following general formula (2):



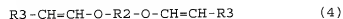
in the formula, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue,

with a (meth)acrylic ester represented by the following general formula (3):



in the formula, R1 represents a hydrogen atom or a methyl group and R4 represents an organic residue, and

said hydroxyl group-containing vinyl ether containing at least one compound selected from the group consisting of a divinyl ether represented by the following general formula (4):



in the formula, R2 represents an organic residue and the two R3 groups are the same or different and each represents a hydrogen atom or an organic residue,

a 2-substituted-1,3-dioxo compound represented by the following general formula (5):

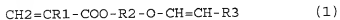
in the formula, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue, and

an unsaturated bond-containing vinyl ether represented by the following general formula (6):



in the formula, R3 represents a hydrogen atom or an organic residue; R5 represents an organic residue containing an unsaturated bond represented by $-CR6=CR7-$; and R6 and R7 are the same or different and each represents a hydrogen atom or an organic residue.

9. A method of producing a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



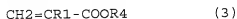
in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue,

which comprises reacting a hydroxyl group-containing vinyl ether represented by the following general formula (2):



in the formula, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue,

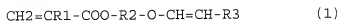
with a (meth)acrylic ester represented by the following general formula (3):



in the formula, R1 represents a hydrogen atom or a methyl group and R4 represents an organic residue,

in the presence of not more than 5% by weight of water.

10. A method of producing a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



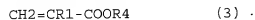
in the formula, R₁ represents a hydrogen atom or a methyl group, R₂ represents an organic residue and R₃ represents a hydrogen atom or an organic residue,

which comprises reacting a hydroxyl group-containing vinyl ether represented by the following general formula (2):



in the formula, R₂ represents an organic residue and R₃ represents a hydrogen atom or an organic residue,

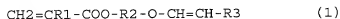
with a (meth)acrylic ester represented by the following general formula (3):



in the formula, R₁ represents a hydrogen atom or a methyl group and R₄ represents an organic residue,

in an atmosphere such that a molecular oxygen concentration is 0.01 to 10% by volume.

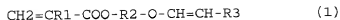
11. A method of producing a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



in the formula, R₁ represents a hydrogen atom or a methyl group, R₂ represents an organic residue and R₃ represents a hydrogen atom or an organic residue,

which comprises carrying out said method of producing a vinyl ether group-containing (meth)acrylic ester in a lightproof structure.

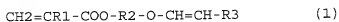
12. A method of producing a vinyl ether group-containing (meth)acrylic ester as in claim 11 represented by the following general formula (1):



in the formula, R₁ represents a hydrogen atom or a methyl group, R₂ represents an organic residue and R₃ represents a hydrogen atom or an organic residue,

which comprises carrying out said method of producing a vinyl ether group-containing (meth)acrylic ester in a lightproof structure in an atmosphere such that a molecular oxygen concentration in the gaseous phase within said lightproof structure is 0.01 to 15% by volume.

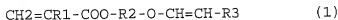
13. A method of purifying a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



in the formula, R₁ represents a hydrogen atom or a methyl group, R₂ represents an organic residue and R₃ represents a hydrogen atom or an organic residue,

which comprises carrying out said method of purifying a vinyl ether group-containing (meth)acrylic ester in an atmosphere such that a molecular oxygen concentration in the gaseous phase in the purification system is 0.01 to 10% by volume.

14. A method of purifying a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



in the formula, R₁ represents a hydrogen atom or a methyl group, R₂ represents an organic residue and R₃ represents a hydrogen atom or an organic residue,

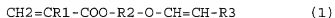
which comprises carrying out said method of purifying a vinyl ether group-containing (meth)acrylic ester in a lightproof structure in an atmosphere such that a molecular oxygen concentration in the gaseous phase in the purification system is 0.01 to 15% by volume.

15. The method of purifying a vinyl ether group-containing (meth)acrylic ester according to Claim 13,

wherein said purification of a vinyl ether group-containing (meth)acrylic esters is carried out in the manner of distillation purification.

16. A method of producing the vinyl ether group-containing (meth)acrylic ester composition according to Claim 2,

which comprises causing a radical polymerization inhibitor, or both of a radical polymerization inhibitor and a basic compound to coexist with a vinyl ether group-containing (meth)acrylic ester represented by the following general formula (1):



in the formula, R1 represents a hydrogen atom or a methyl group, R2 represents an organic residue and R3 represents a hydrogen atom or an organic residue.

17. The method of purifying a vinyl ether group-containing (meth)acrylic ester according to Claim 14,

wherein said purification of a vinyl ether group-containing (meth)acrylic esters is carried out in the manner of distillation purification.